{

}

```
#include<stdio.h>
int main()
    int bt[20], p[20], wt[20], tat[20], pr[20], i, j, n, total=0, pos, temp, avg wt, avg tat;
    printf("Enter Total Number of Process:");
    scanf("%d",&n);
    printf("\nEnter Burst Time and Priority\n");
    for (i=0;i<n;i++)</pre>
    {
        printf("\nP[%d]\n",i+1);
        printf("Burst Time:");
        scanf("%d", &bt[i]);
        printf("Priority:");
        scanf("%d",&pr[i]);
        p[i]=i+1;
                              //contains process number
    }
    //sorting burst time, priority and process number in ascending order using selection sort
    for (i=0;i<n;i++)</pre>
    {
        pos=i;
        for (j=i+1; j<n; j++)</pre>
             if(pr[j]<pr[pos])</pre>
                 pos=j;
        }
        temp=pr[i];
        pr[i]=pr[pos];
        pr[pos]=temp;
        temp=bt[i];
        bt[i]=bt[pos];
        bt[pos]=temp;
        temp=p[i];
        p[i]=p[pos];
        p[pos]=temp;
    }
                 //waiting time for first process is zero
    wt[0]=0;
    //calculate waiting time
    for (i=1;i<n;i++)</pre>
    {
        wt[i]=0;
        for (j=0;j<i;j++)</pre>
            wt[i]+=bt[j];
        total+=wt[i];
    }
    avg wt=total/n;
                           //average waiting time
    total=0;
    printf("\nProcess\t
                             Burst Time
                                            \tWaiting Time\tTurnaround Time");
    for (i=0;i<n;i++)</pre>
    {
        tat[i]=bt[i]+wt[i];
                                   //calculate turnaround time
        total+=tat[i];
        printf("\nP[%d]\t\t %d\t\t
                                          %d\t\t\t%d",p[i],bt[i],wt[i],tat[i]);
    }
    avg tat=total/n;
                           //average turnaround time
    printf("\n\nAverage Waiting Time=%d",avg wt);
    printf("\nAverage Turnaround Time=%d\n",avg tat);
    return 0;
```